

Listing of Claims:

1. (Currently Amended) A method for transmission of data over a data transmission network, comprising:

employing, in the data transmission network, a network layer protocol from a first network node receiving data from a first circuit switched transmission line to a second network node transmitting data into a second circuit switched transmission line; and
determining, in accordance with a predefined rule, characterized in that the a
destination address of a network layer protocol datagram comprising data received from the first circuit switched transmission line for transmission to the second network node~~[[,]] is determined from~~ based on ~~[[-]]~~ circuit switched channel identifying parameters which identify ~~identifying~~ at least one ~~[[-]]~~ channel in the second circuit switched transmission line~~[[,]]~~ and ~~[[-]]~~ the network layer protocol address of the second network node~~[[,]]~~ according to a predefined rule.

2. (Currently Amended) A The method according to claim 1, ~~characterized in that~~
wherein the network layer protocol is ~~the~~ an IP protocol.

3. (Currently Amended) A The method according to claim 1, ~~characterized in that~~
wherein the network layer protocol is ~~the~~ an X.25 protocol.

4. (Currently Amended) A The method according to claim 1, ~~characterized in that~~
wherein data from at least one channel ~~from~~ of the first circuit switched transmission line is transmitted ~~in~~ as compressed data ~~form~~ over the data transmission network.

5. (Currently Amended) A The method according to claim 4, ~~characterized in that~~
wherein only compressed speech signal parameters of a signal received from a said at least one
channel of the first circuit switched transmission line are transmitted over the data transmission
network[[,]]:

wherein said received ~~which~~ signal comprises ~~both~~ an uncompressed speech signal part and compressed speech parameters~~[[,]]~~ ~~only said compressed speech signal parameters are transmitted over the data transmission network.~~

6. (Currently Amended) A The method according to claim 4, ~~characterized in that~~ wherein the received signal of said at least one channel ~~from~~ of the first circuit switched transmission line is compressed in the first network node.

7. (Currently Amended) A The method according to claim 4, ~~characterized in that~~ wherein compressed speech parameters received from the first network node~~[[,]]~~ are decompressed into an uncompressed speech signal before transmission into the second circuit switched transmission line.

8. (Currently Amended) A The method according to claim 1, ~~characterized in that~~ wherein samples of data from more than one of the at least one channel ~~channels from~~ of the first circuit switched transmission line are transmitted over the data transmission network in one network layer protocol datagram.

9. (Currently Amended) A The method according to claim 1, ~~characterized in that the method comprises steps, in which~~ further comprising the steps of:

[[-]] transmitting a message which describes ~~describing the~~ supported coding modes for compressed speech parameters ~~is transmitted~~ from the first network node to the second network node~~[[,]]~~; and

[[-]] describing said supported coding modes ~~are described~~ in said transmitted message in an order of preference for optimizing speech data transmission.

10. (Original) A network element for connection of a circuit switched transmission line to a data transmission network employing a network layer protocol, ~~characterized in that~~ wherein the network element comprises a network layer protocol address generating unit for generating network layer protocol addresses for network layer protocol packets based at least partly on parameters identifying at least one channel of the circuit switch transmission line.

11. (Currently Amended) A The network element according to claim 9 10, ~~characterized~~
~~in that~~ wherein the network layer protocol is ~~the~~ an IP protocol.

12. (Currently Amended) A The network element according to claim 9 10, ~~characterized~~
~~in that~~ wherein the network element comprises a compressed speech parameter extraction unit
for extracting compressed speech parameters from at least one signal from the circuit switched
transmission line, ~~which~~ said at least one signal ~~comprises~~ comprising ~~both~~ an uncompressed
speech signal part and compressed speech parameters.

13. (Currently Amended) A The network element according to claim 9 10, ~~characterized~~
~~in that~~ wherein the network element comprises a compression unit for compressing ~~the~~ a signal
of at least one channel ~~from~~ of the circuit switched transmission line before transmission over the
data transmission network.

14. (New) A method for transmission of data over a data transmission network,
comprising:

employing, in the data transmission network, a network layer protocol
from a first network node receiving data from a first circuit switched transmission
line to a second network node transmitting data into a second circuit switched
transmission line;

determining, in accordance with a predefined rule, a destination address of
a network layer protocol datagram comprising data received from the first circuit
switched transmission line for transmission to the second network node based on
circuit switched channel identifying parameters which identify at least one
channel in the second circuit switched transmission line and a network layer
protocol address of the second network node; and

inserting status information into the datagram.

15. (New) The method according to claim 14, wherein said status information comprises
at least an indicator to indicate activity of the at least one channel, a length of samples of the at
least one channel and whether channel information definition is comprised in the datagram.

16. (New) A method for transmission of data over a data transmission network, comprising:

employing, in the data transmission network, a network layer protocol from a first network node receiving data from a first circuit switched transmission line to a second network node transmitting data into a second circuit switched transmission line;

determining, in accordance with a predefined rule, a destination address of a network layer protocol datagram comprising data received from the first circuit switched transmission line for transmission to the second network node based on circuit switched channel identifying parameters which identify at least one channel in the second circuit switched transmission line and a network layer protocol address of the second network node; and

determining an IP address based on a time slot number having data which is transferred in the datagram.

14. 17. (New) A network element configured to implement the method according to claim

16. 18. (New) A network element configured to implement the method according to claim

19. (New) A method for transmission of data over a data transmission network, comprising:

employing, in the data transmission network, a network layer protocol from a first network node receiving data from a first circuit switched transmission line to a second network node transmitting data into a second circuit switched transmission line;

determining, in accordance with a predefined rule, a destination address of a network layer protocol datagram comprising data received from the first circuit switched transmission line for transmission to the second network node based on circuit switched channel identifying

parameters which identify at least one channel in the second circuit switched transmission line and a network layer protocol address of the second network node;

inserting a number of samples from said at least one channel of a transmission line into a payload portion of a data packet; and

indicating a destination transmission line and a channel within the transmission line in a destination packet address.

19. 20. (New) A network element configured to implement the method according to claim